

Amendments to the Claims:

1. (Currently amended) A method for preventing oxidative corrosion of a metal, comprising:

applying an anti-corrosion composition to a surface of a metal or a device containing a metal susceptible to oxidative corrosion, said composition comprising an ~~effective~~ amount of an anti-corrosion agent comprising a lower alkyl carboxylic acid moiety effective for forming an anti-corrosive barrier over said surface, said composition and optionally further comprising a moisture retentive barrier forming material in an amount effective for forming a ~~capable of forming a moisture retentive barrier over a surface of said metal, wherein said composition forms an anti-corrosive,~~ moisture retentive barrier over said surface.

2. (Original) The method of claim 1, wherein said lower alkyl carboxylic acid moiety is in the form of a lower alkyl carboxylic acid anion.

3. (Original) The method of claim 1, further comprising:
preparing an anti-corrosion solution, said solution comprising an effective amount of an anti-corrosion agent in a polar solvent, said agent comprising a lower alkyl carboxylic acid moiety;
applying said solution to a surface of said metal; and
subsequently applying a moisture retentive barrier over said surface.

4. (Original) The method of claim 1, wherein said anti-corrosion agent and said material capable of forming a moisture retentive barrier over a surface of said metal are in powdered form.

5. (Original) The method of claim 1, wherein said anti-corrosion agent and said material capable of forming a moisture retentive barrier over a surface of said metal are both provided in powdered form to produce a powdered composition; and wherein said powdered composition is applied to a surface of said metal by powder metallurgy processing.

6. (Original) The method of claim 1, wherein said material capable of forming a moisture retentive barrier over a surface of said metal is selected from the group consisting of a polar liquid, a nonpolar liquid, a viscous material, an organic liquid, a polymeric material and a petroleum-based substance, and mixtures thereof.

7. (Original) The method of claim 1, wherein said composition further comprises any one of a polar liquid, a non-polar liquid, a surfactant, an antioxidant, an organic liquid, a polymeric material, a petroleum-based substance, a buffering material, or graphite or particulate carbon in a suspension.

8. (Original) The method of claim 1, wherein said anti-corrosion agent is packaged for delayed release.

9. (Original) The method of claim 8, wherein said anti-corrosion agent is encapsulated.

10. (Original) The method of claim 1, wherein in said composition, said anti-corrosion agent is present at a concentration from about 0.2 to about 60 percent by weight.

11. (Original) The method of claim 1, wherein said composition is first prepared in concentrated form and then diluted.

12. (Original) The method of claim 1, said method further comprising, following said applying step, the step of applying a further coating layer over said surface.

13. (Original) The method of claim 12, wherein said further coating layer is applied by a process selected from the group consisting of painting, electro-plating and electro-polishing.

14. (Original) The method of claim 1, wherein said applying step comprises using said composition as a lubricant for a surface of said metal.

15. (Original) The method of claim 1, wherein said applying step comprises using said composition as a pump oil or brake fluid.

16. (Original) The method of claim 1, wherein said lower alkyl carboxylic acid moiety is derived from a C1-C6 carboxylic acid.

17. (Original) The method of claim 1, wherein said lower alkyl carboxylic acid moiety is derived from a C1-C6 carboxylate.

18. (Original) The method of claim 17, wherein said C1-C6 carboxylate is selected from the group consisting of formate, acetate, propionate, butyrate, and 2-methyl propionate, and mixtures thereof.

19. (Original) The method of claim 18, wherein said C1-C6 carboxylate comprises a cation selected from alkali metal or alkaline earth metal cations.

20. (Original) The method of claim 19, wherein said cation is sodium.

21. (Original) The method of claim 1, wherein said lower alkyl carboxylic acid moiety is derived from sodium propionate.

22. (Original) The method of claim 1, wherein said anti-corrosion agent is ingestible by humans.

23. (Original) The method of claim 22, wherein said composition further comprises at least one additional anti-corrosive agent that is different from said lower alkyl carboxylic acid moiety and which is also ingestible by humans.

24. (Original) The method of claim 23, wherein said at least additional anti-corrosion agent comprises a 2,4-trans, trans-hexadiene moiety.

25. (Original) The method of claim 24, wherein said 2,4-trans, trans-hexadiene moiety is in the form of a 2,4-trans, trans-hexadienoic anion.

26. (Original) The method of claim 22, wherein said composition further comprises at least one compound capable of increasing the solubility of said ingestible anti-corrosion agent.

27. (Original) The method of claim 1, wherein said composition further comprises a benzoic moiety.

28. (Original) The method of claim 1, wherein said composition comprises a propionic anion, a 2,4-trans, trans-hexadienoic anion and a benzoic anion.

29. (Original) A method for preventing oxidative corrosion of a metal, said method comprising the steps of:

providing a metal or a device containing a metal wherein said metal is susceptible to oxidative corrosion;

preparing an anti-corrosion solution, said solution comprising an effective amount of an anti-corrosion agent dissolved in a polar solvent, said agent comprising a C1-C6 carboxylic acid moiety; and

continuously immersing said metal or said device in said solution.

30. (Original) The method of claim 29, wherein said C1-C6 carboxylic acid moiety is in the form of a propionic anion.

31-70. (Canceled)